

DETAILED ACTION

1. This is a Final Office Action in response to communications received 28 January 2010, wherein: Claims 1,18, and 19 have been amended; and Claims 1-4, 9-13, 15-22, 27-31, and 33-37 are pending.

Response to Arguments

2. As Applicant's remarks are directed to newly added limitations, see rejections below.

Claim Rejections - 35 USC § 103

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. **Claims 1, 3, 4, 9-12, 15-17, 19, 21, 22, 27-30, and 33-37** are rejected under 35 U.S.C. 103(a) as being unpatentable over Thompson et al. (US 6,668,253) in view of Kesler (US 7,062,502).

Regarding Claims 1 and 19, Thompson discloses a computer-implemented method of providing object-based content to be reported in an external computer-implemented general reporting application, the method comprising: providing an electronic storage repository of business database objects from which object instances are able to be generated, which business database objects each have one or more attributes for which applicable data are able to be provided for a generated object instance (column 2, lines 24-60; column 20, lines 41-53; column 32, line 37- column 33, line 55; it is implicit with object-oriented programming that object instances are generated and that the objects have attributes); receiving, in a data processing

system comprising at least one computer, a user selection of one of the business database objects, wherein generated instances of the selected object have data for attributes of the object (column 8, lines 15-22; Figures 5-7; selection of stock and then selection of max days, for example).

Thompson does not explicitly disclose displaying on a display device a view that includes:

i) the selected business database object in a first portion of the view, ii) at least some of the attributes associated with the selected business database object in a second portion of the view, iii) a plurality of business objects each having associated attributes, wherein each of the business objects has a defined relationship to the selected business database object in a third portion of the view, and iv) at least some of the attributes for the plurality of related business objects in a fourth portion of the view.

However, Thompson discloses displaying on a display device selected business objects with attributes and associated business objects with attributes (column 7, lines 12-14; Figures 3, 7, and 25I; items are selected from the component view to put into the layout view). Thompson discloses the various business objects and attributes in a single view, in a single window in Figure 7. That is to say, when the tree is expanded, the business objects and respective attributes are in a single view. Thompson further discloses four windows with business objects and attributes in Figure 3. Also, the quick drill feature allows further views. At the time the invention was made, it would have been an obvious matter of design choice to a person of ordinary skill in the art to provide four separate windows instead of the tree hierarchy of Figure 7. Also, Thompson discloses defined relationships in Figures 25A - 25J. Though the objects, attributes, and relationships are not presented or formatted in the exact same way, the

functionality is the same, i.e., to select business objects and attributes to form a report. In other words, one of ordinary skill in the art would have expected Applicant's invention to perform equally well with either the one view of the tree hierarchy showing the business objects and attributes or the one view with four windows. Therefore, it would have been an obvious matter of design choice to modify Thompson to obtain the formatting as specified in claim 1.

Furthermore, Examiner notes that *it must be remembered that the "obviousness" test of § 103 is not one which turns on whether an invention is equivalent to some element in the prior art but rather whether the difference between the prior art and the subject matter in question "is a difference sufficient to render the claimed subject matter unobvious to one skilled in the applicable art * * *."* *Dann v. Johnston*, 425 U.S. 219, 189 USPQ 257 (1976). Examiner further notes that *the mere existence of differences between the prior art and an invention does not establish the invention's nonobviousness. The gap between the prior art and respondent's system is simply not so great as to render the system nonobvious to one reasonably skilled in the art.* *Ibid.* Thompson discloses business objects and attributes as well as defined relationships. Therefore, that Thompson's example does not state the exact same formatting does not effectively serve to patentably distinguish the claimed invention over the prior art.

Thompson further discloses receiving in the data processing system a user selection of at least one of the displayed one or more attributes associated with the selected business database object, and a user selection of at least one of the displayed attributes for the plurality of related business objects, and adding the selected attributes to an electronic business content structure of selected attributes (column 8, lines 29-35 and 53-61; Figure 7); defining a report layout using the electronic business content structure and the selected attributes, wherein the report layout

defines the structure of one or more reports (column 10, line 63 – column 11, line 15); executing a query of records in an electronic database and retrieving, for each of the records that meet the query, attribute data for each of the attributes in the electronic business content structure (column 14, lines 9-19); generating in the data processing system and before reporting run-time, an output electronic file that the external computer-implemented reporting application can use to generate a report, the report to include the electronic business content structure and the attribute data associated therewith, and to be structured according to the report layout (Figures 12-14).

Thompson does not explicitly disclose determining, at the reporting run-time, one of a plurality of external computer-implemented reporting applications for use in generating the report; and launching the determined reporting application using the output electronic file and generating the report in the determined reporting application according to the previously defined report layout.

However, Kesler teaches determining, at the reporting run-time, one of a plurality of external computer-implemented reporting applications for use in generating the report (column 38, lines 32-40; *Crystal Reports, Microsoft Access*); and launching the determined reporting application using the output electronic file and generating the report in the determined reporting application according to the previously defined report layout (column 37, line 50 – column 38, line 46; Kesler teaches a Component Object Model *interface that provides for communication between the UI [User Interface] and external software components*).

Thompson further discloses *[b]ecause EIM integrates third party software packages to accomplish some of the report generation and execution, the interface will make use of the products already provided* (column 8, lines 31-34). Examiner notes the plurality of third party software packages and the interface that makes use of the plurality of products. Thompson further discloses the use of Excel and a word processing application such as Microsoft Word (column 9, lines 17-21; column 31, lines 61-67; *Financial statements are produced not only in printed or word processor forms but also in HTML*; it is implicit that there is a word processing application such as Microsoft Word). Therefore, it would have been obvious to one of ordinary skill in the art at the time of the invention to modify the invention of Thompson with that of Kesler to provide easy transition to external reporting applications in order to take advantage of what has already been developed.

Regarding Claims 3, 10, 21, and 28, respectively, Thompson further teaches wherein the electronic business content structure represents meta-data information (column 32, line 37 – column 33, lines 55).

Regarding Claims 4 and 22, Thompson further teaches displaying on the display device a view of a plurality of electronic business content structures and receiving a user selection of one of the electronic business content structures to be included in a report (column 8, lines 29-35; Figure 6).

Regarding Claims 9 and 27, Thompson further teaches defining a calculated field to be included in the electronic business content structure, wherein the calculated field is associated with a function that takes one or more business object attributes as input, and uses a formula to

compute a resultant value for the calculated field based on the input (column 7, lines 47-54; column 9, lines 34-44; subtotals).

Regarding Claims 11 and 29, Thompson does not explicitly teach wherein the resultant value is included in the electronic output file. However, Thompson teaches calculation capabilities, subtotals (see Claims 9 and 27), as well as the capability to consolidate financial information. Also, Thompson discloses the use of third party product for use in reporting (column 30, lines 30-41; Figure 4; the subtotals or resultant values would be in the output file so that they can be used in the external reporting application).

Regarding Claims 12 and 30, Thompson further teaches persistently storing the electronic business content structure in an electronic database (column 4, lines 56-59).

Regarding Claims 15 and 33, Thompson further teaches wherein the database query is an SQL query that uses the concept of derived tables (column 14, lines 9-19).

Regarding Claims 16 and 34, Thompson does not explicitly teach wherein the electronic output file is an ActiveX Data Object Recordset. However, Thompson discloses the invention operates on browsers with support for ActiveX controls (column 30, lines 49-54).

Regarding Claims 17 and 35, Thompson does not explicitly teach wherein generating the electronic output file that the external computer-implemented reporting application can use to generate the report further comprises transferring the output electronic file to a reporting-tool-specific interface component capable of plug-and-play interaction with the external computer-

implemented reporting application. However, Thompson discloses the use of MicroStrategy™ DSS Web (column 12, lines 45-59) which is known to employ plug-n-play components.

Regarding Claims 36 and 37, Thompson further teaches displaying a pictorial representation of the selected business database object and one or more of the related business objects (Figures 5 and 7).

5. **Claims 2 and 20** are rejected under 35 U.S.C. 103(a) as being unpatentable over Thompson in view of Kesler and further in view of SAMS Teach Yourself Microsoft Access 2000 (hereinafter referred to as Access).

Regarding Claims 2 and 20, Thompson does not explicitly teach wherein a business content design wizard assists in defining the electronic business content structure. However, Access discloses creating databases and tables with a wizard (pages 201-214). Wizards are well known in the art. It would have been obvious to one of ordinary skill in the art at the time of the invention to modify the Thompson invention to incorporate wizards in order to provide an efficient and user-friendly way to create databases and tables.

6. **Claims 13 and 31** are rejected under 35 U.S.C. 103(a) as being unpatentable over Thompson in view of Kesler and further in view of Bata et al. (US 6,901,403).

Regarding Claims 13 and 31, Thompson does not explicitly teach wherein the electronic business content structure is stored as an XML document in the electronic database, and wherein the electronic business content structure attributes correspond to tags in the XML document. However, Bata teaches the use of XML in the representation of data (Figure 9). It would have been obvious to one of ordinary skill in the art at the time of the invention for

Thompson to incorporate XML into the invention as the XML format is well known for being conducive to capturing the structure of data for network functionality.

7. **Claim 18** is rejected under 35 U.S.C. 103(a) as being unpatentable over Thompson et al. (US 6,668,253).

Regarding Claim 18, Thompson teaches a computer-implemented method of providing object-based content to be reported in an external computer-implemented general reporting application, the method comprising: receiving, in a data processing system comprising at least one computer, a user selection of a business database object having associated attributes, wherein generated instances of the selected object have data for the associated attributes (column 8, lines 15-22; Figures 5-7).

Thompson does not explicitly teach displaying on a display device a view that includes:

i) the selected business database object in a first portion of the view, ii) at least some of the attributes associated with the selected business database object in a second portion of the view, iii) a plurality of business objects each having associated attributes, wherein each of the business objects has a defined relationship to the selected business database object in a third portion of the view, and iv) at least some of the attributes for the plurality of related business objects in a fourth portion of the view.

However, Thompson teaches displaying on a display device selected business objects with attributes and associated business objects with attributes (column 7, lines 12-14; Figures 3, 7, and 25I; items are selected from the component view to put into the layout view). Thompson discloses the various business objects and attributes in a single view, in a single window in

Figure 7. That is to say, when the tree is expanded, the business objects and respective attributes are in a single view. Thompson further discloses four windows with business objects and attributes in Figure 3. Also, the quick drill feature allows further views. At the time the invention was made, it would have been an obvious matter of design choice to a person of ordinary skill in the art to provide four separate windows instead of the tree hierarchy of Figure 7. Also, Thompson discloses defined relationships in Figures 25A - 25J. Though the objects, attributes, and relationships are not presented or formatted in the exact same way, the functionality is the same, i.e., to select business objects and attributes to form a report. In other words, one of ordinary skill in the art would have expected Applicant's invention to perform equally well with either the one view of the tree hierarchy showing the business objects and attributes or the one view with four windows. Therefore, it would have been an obvious matter of design choice to modify Thompson to obtain the formatting as specified in claim 1.

Furthermore, Examiner notes that *it must be remembered that the "obviousness" test of § 103 is not one which turns on whether an invention is equivalent to some element in the prior art but rather whether the difference between the prior art and the subject matter in question "is a difference sufficient to render the claimed subject matter unobvious to one skilled in the applicable art * * *."* *Dann v. Johnston*, 425 U.S. 219, 189 USPQ 257 (1976). Examiner further notes that *the mere existence of differences between the prior art and an invention does not establish the invention's nonobviousness. The gap between the prior art and respondent's system is simply not so great as to render the system nonobvious to one reasonably skilled in the art.* *Ibid.* Thompson discloses business objects and attributes as well as defined relationships. Therefore, that Thompson's example does not state the exact same formatting does not effectively serve to patentably distinguish the claimed invention over the prior art.

Thompson further discloses receiving in the data processing system a user selection of at least one of the displayed one or more attributes associated with the selected business database object, and a user selection of at least one of the displayed attributes for the plurality of related business objects, and adding the selected attributes to an electronic business content structure of selected attributes (column 8, lines 29-35 and 53-61; Figure 7); and persistently storing the electronic business content structure in an electronic database so that it can later be retrieved and used to generate, before reporting run-time, an output file that the external computer-implemented general reporting application can use to generate a report with current data (column 4, lines 56-59); defines a report layout using the electronic business content structure and the selected attributes, wherein the report layout defines the structure of one or more reports (column 10, line 63 – column 11, line 15).

Conclusion

8. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event,

however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Debra Antonienko whose telephone number is 571-270-3601. The examiner can normally be reached on Monday through Thursday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Janice Mooneyham can be reached on 571-272-6805. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Da

/Janice A. Mooneyham/
Supervisory Patent Examiner, Art Unit 3689